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Renesas Technology Corp.
Customer Support Dept.
April 1, 2003

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Keep safety first in your circuit designs!

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Remember to give due consideration to safety when making your circuit designs, with appropriate measures such as (i) placement of substitutive, auxiliary circuits, (ii) use of nonflammable material or (iii) prevention against any malfunction or mishap.

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HRU0302A

Silicon Schottky Barrier Diode for Rectifying



ADE-208-235G(Z)

Rev. 7
Jul. 1998

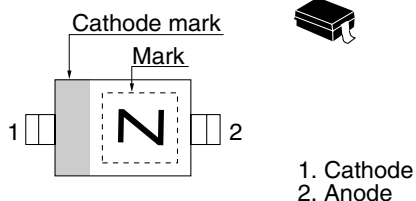
Features

- Low forward voltage drop and suitable for high efficiency rectifying.
- Ultra small Resin Package (URP) is suitable for high density surface mounting and high speed assembly.

Ordering Information

Type No.	Laser Mark	Package Code
HRU0302A	Z	URP

Pin Arrangement



Absolute Maximum Ratings

(Ta = 25°C)

Item	Symbol	Value	Unit
Repetitive peak reverse voltage	V_{RRM}^{*1}	20	V
Average rectified current	I_O^{*1}	300	mA
Non-Repetitive peak forward surge current	I_{FSM}^{*2}	3	A
Junction temperature	Tj	125	°C
Storage temperature	Tstg	-55 to +125	°C

Notes 1. See from Fig.4 to Fig.6

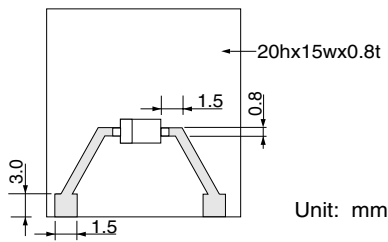
Notes 2. 10msec sine wave 1 pulse

Electrical Characteristics

(Ta = 25°C)

Item	Symbol	Min	Typ	Max	Unit	Test Condition
Forward voltage	V_F	—	—	0.40	V	$I_F = 300\text{ mA}$
Reverse current	I_R	—	—	100	μA	$V_R = 20\text{V}$
Capacitance	C	—	70	—	pF	$V_R = 0\text{V}$, $f = 1\text{ MHz}$
Thermal resistance	$R_{th(j-a)}$	—	440	—	°C/W	Polyimide board ^{*1}

Notes 1. Polyimide board



Main Characteristic

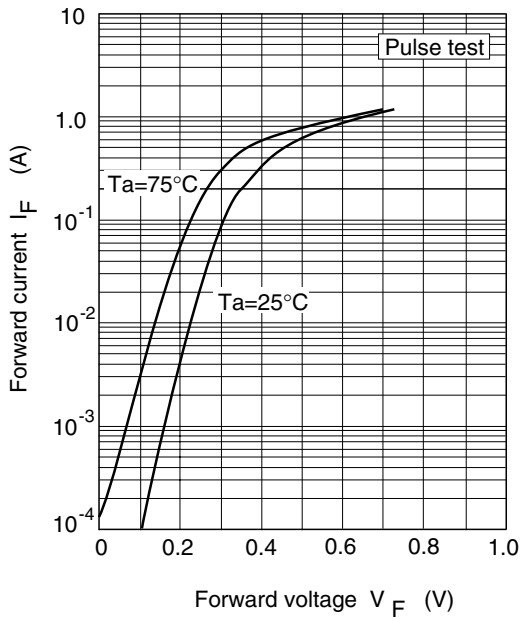


Fig.1 Forward current Vs. Forward voltage

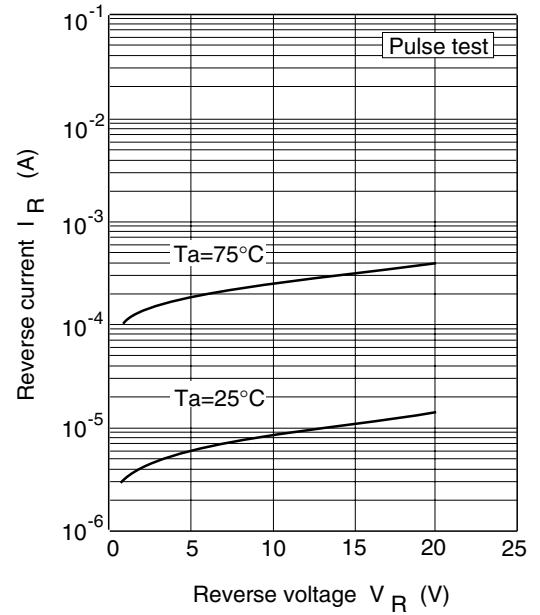


Fig.2 Reverse current Vs. Reverse voltage

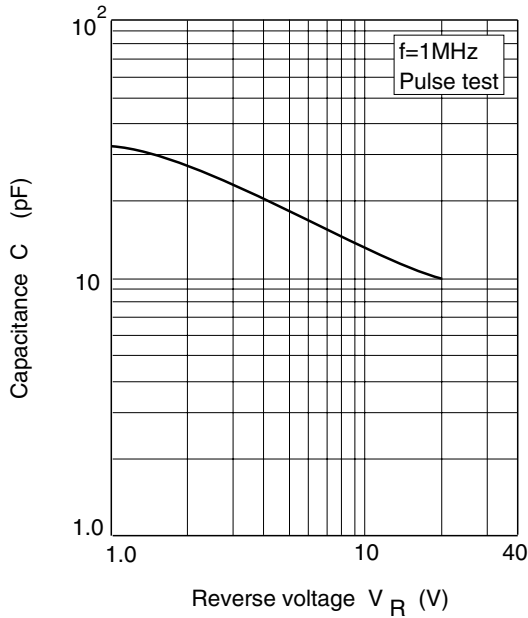


Fig.3 Capacitance Vs. Reverse voltage

Main Characteristic

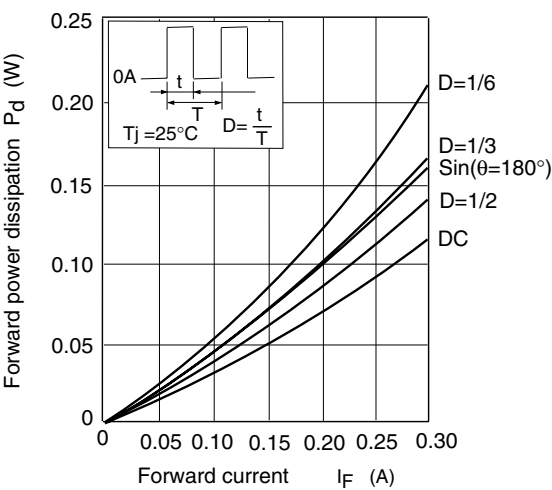


Fig4. Forward power dissipation Vs. Forward current

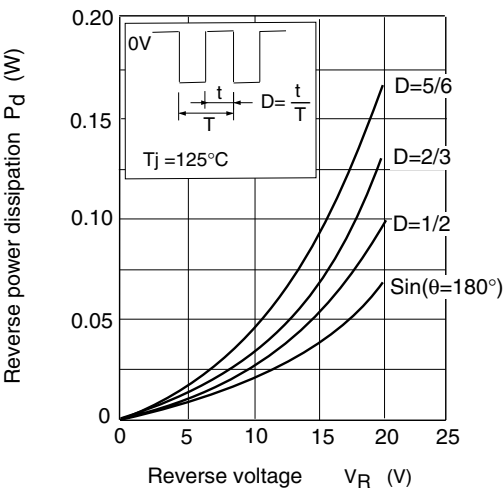


Fig5. Reverse power dissipation Vs. Reverse voltage

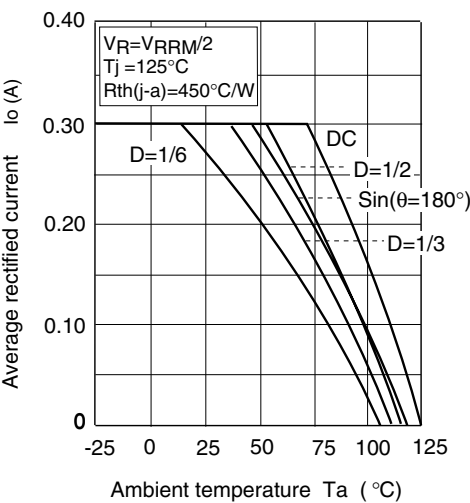
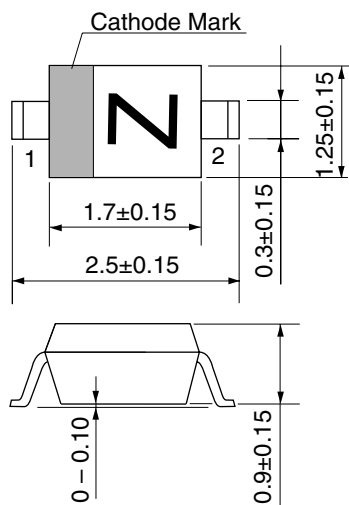


Fig.6 Average rectified current Vs. Ambient temperature

Package Dimensions

Unit : mm



1. Cathode
2. Anode

Hitachi Code	URP
JEDECCode	—
EIAJCode	—
Weight(g)	0.004

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